



Massachusetts Bay Transportation Authority

Red and Orange Line Vehicle Procurement—Recommendation for Award

MassDOT Board of Directors

October 22, 2014

Dr. Beverly A. Scott
General Manager and
Rail & Transit Administrator

Recommendation

- **Award to CNR MA Corporation**
 - Massachusetts Corporation
 - Joint Venture of China CNR Corporation Limited and China Changchun Railway Vehicles Company
- **284 Orange/Red Line Cars**
 - 152 Orange Line Cars (additional 32)
 - 132 Red Line Cars (includes 58 option, No. 2 cars)
- **Total Contract Value: \$566.6M (Base and Options)**

Who is CNR?

- Largest railcar manufacturer in the world
- \$16B Revenue (2013)
- Skilled worldwide workforce of 90,000
- Built rail cars for more than 13 countries including Brazil, Argentina, Australia, New Zealand, Hong Kong
- 53 million sq-ft manufacturing facility; 4 transit test tracks (in Changchun)



CNR MA — Final Assembly Facility Highlights



- CNR's North American manufacturing headquarters (655 Page Blvd in Springfield, MA)
- CNR will invest \$60 million
- Over 150,000 sq-ft of manufacturing/office space planned in first phase; 1,800 foot test track
- “Shovel-ready”, environmentally cleared 40 acre site



CNR MA Massachusetts Workforce

- **250 new local jobs created at Springfield facility**
- **Contractual commitment to *diverse workforce* that reflects demographics of community**
- **Workforce Plan *requires*:**
 - **Labor Harmony**
 - **Pay rates/benefits comparable to region**
 - **Trades paid no less than prevailing rates/benefits (Massachusetts Department of Labor and Industries)**

Timeline/Key Dates

- **Delivery Schedule**
 - Orange Line pilot cars ready **36 months from NTP (2018)**
 - Orange Line production cars **48 months from NTP (2019)**
 - Red Line pilot cars ready **51 months from NTP (2019)**
 - Red Line production cars **59 months from NTP (2019)**
- **Delivery Complete: 2023 (Red Line Option Cars)**

Procurement Process: Technical Evaluation

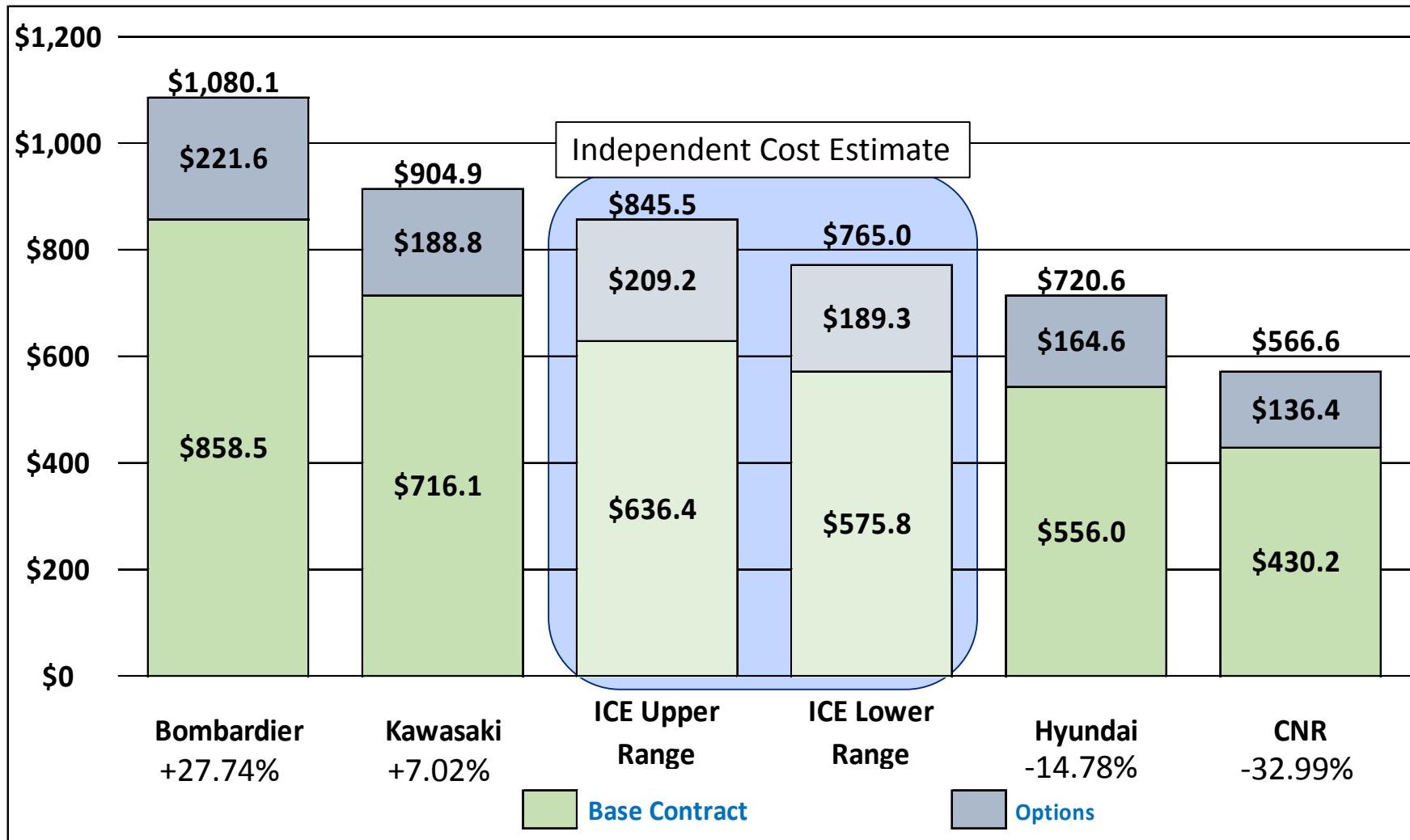
- **6 Proposals (May 15, 2014)**
 - Bombardier (Canada), CAF (Spain), CNR MA (China), CSR (China),
Hyundai-Rotem (Korea), Kawasaki (Japan)
 - CAF: Did not offer an acceptable Letter of Credit
- **4 Proposals Rated “Acceptable”**
 - Bombardier
 - CNR MA
 - Hyundai-Rotem
 - Kawasaki Rail Car
- **CSR Proposal Rated “Unacceptable”**
- **4 Price Proposals opened at conclusion of Technical Evaluations**

Technical Factors/Ratings

FACTOR	BOMBARDIER	CNR	CSR	HYUNDAI-ROTEM	KAWASAKI
Technical	Good	Acceptable	Unacceptable	Acceptable	Acceptable
Manufacturing	Potential to Become Acceptable	Good	Unacceptable	Acceptable	Acceptable
Past Performance	Acceptable	Acceptable	Potential to Become Acceptable	Potential to Become Acceptable	Acceptable
Quality Assurance	Acceptable	Acceptable	Unacceptable	Acceptable	Acceptable
M/WBE	Potential to Become Acceptable	Good	Acceptable	Acceptable	Good
OVERALL	ACCEPTABLE	ACCEPTABLE	UNACCEPTABLE	ACCEPTABLE	ACCEPTABLE

Individual Price Proposals Compared to ICE

Base + Options (\$, Millions)



Risk Mitigation Contract Provisions

- **\$270M Letter of Credit (48% of the contract value)**
- **Project Management**
 - Executive/Senior Management Engagement Throughout
 - U.S. based CNR MA Project Management Team
 - Joint CNR MA/MBTA Local Area Office
 - MBTA Engineers at Changchun facility
 - Cultural Liaison
- **Subcontractors Fully Integrated into Design Process**
- **Inspections/Testing Procedures MA Site**
- **Quarterly MassDOT Board Updates**

Summary

- **Award to CNR MA Corporation**
- **284 Orange/Red Line Cars (includes options)**
- **Contract Value: \$566.6M**
- **CNR North American Headquarters (Springfield, MA Final Assembly)**
- **60% domestic content**
- **250 new local jobs**
- **Workforce to reflect community diversity; competitive wages; workforce harmony**
- **Minority and Women-owned Business Participation**